

# Work Order ID 61228

August 11, 2010 11:06:49 AM



Page 1

Item ID: D2938-1UP

Accept



Setup Start



Revision ID:

Stop



Item Name: 206 Saddle Left side-unpainted

Start Date: 8/11/10 Start Qty: 6.00



Cust Item ID:

Required Date: 8/25/10 Req'd Qty: 6.00

Customer:

Reference:

Run Start



Approvals: Process Plan: CZ Date: 10/8/11 Tooling: \_\_\_\_\_ Date: \_\_\_\_\_

Stop



QC: \_\_\_\_\_ Date: \_\_\_\_\_ SPC (Y/N): \_\_\_\_\_ Date: \_\_\_\_\_

Sequence ID/ Work Center ID	Operation Description	Set Up/ Run Hours	Tool ID	Tool #	Plan Code	Accept Qty	Reject Qty	Reject Number	Insp. Stamp
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Draw Nbr	Revision Nbr
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D2938	Rev C
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100

0.00



HAAS CNC VERTICAL MACHINING #1

HAAS 1

Memo

0.00

DJP 10/08/18

6 1

HAAS CNC vertical machine #1

Program part number and batch number. ☐ 1-Inspect part number and batch number are programmed correctly. ☐ 2-Machine Step No 1 of Folio and visually inspect as per dwg D2938 & attached Dimension Sheet ☐ 3-Machine Step No 2 of Folio and visually inspect as per

PTO →

110

0.00



CONVENTIONAL MILLING MACHINE

Mill Conv

Memo

0.00

DJP 10/08/21

6 1

Conventional Milling Machine

Machine Keyway and inspect per attached dimension sheet

120

QC1- Inspect dimensions to dimension sheet

0.00



QC

Memo

0.00

DJP 10/08/18

6 1

Quality Control

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: D2938-1UP PAR #: \_\_\_\_\_ Fault Category: machining NCR: ☒ Yes No DQA: [Signature] Date: 10/08/25  
 Resolution: Scrap Disposition: Scrap QA: N/C Closed: [Signature] Date: 10/08/30

NCR: <u>61228</u>		WORK ORDER NON-CONFORMANCE (NCR)						
DATE	STEP	Description of NC Section A	Corrective Action Section B			Verification Section C	Approval Chief Eng	Approval QC Inspector
			Initial Chief Eng	Action Description Chief Eng	Sign & Date			
10/08/18	100	First part Skid bolt face is 0,245" act dim is 0,270" New Tombstone Jig that was made to duplicate the tooling is slightly larger than the original. Causing the difference. R.C. Tooling.	<u>[Signature]</u>	Scrap Sineclet & replace qty 1 B <u>59196</u>  Replace the tooling to correct size. verify tooling dims	<u>[Signature]</u> 10/08/23	<u>[Signature]</u>	<u>[Signature]</u>	1008-18
			<u>[Signature]</u>		<u>[Signature]</u>	<u>[Signature]</u>	<u>[Signature]</u>	1008-18

NOTE: Date & initial all entries

**Work Order ID 61228**

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Item ID: D2938-1UP

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Cust Item ID:

Required Date: 8/25/10 Req'd Qty: 6.00



Customer:

Reference:

Run Start



Approvals: Process Plan: \_\_\_\_\_ Date: \_\_\_\_\_ Tooling: \_\_\_\_\_ Date: \_\_\_\_\_

Stop



QC: \_\_\_\_\_ Date: \_\_\_\_\_ SPC (Y/N): \_\_\_\_\_ Date: \_\_\_\_\_

Sequence ID/  
Work Center IDOperation  
DescriptionSet Up/  
Run Hours

Tool ID

Tool #

Plan  
CodeAccept  
QtyReject  
QtyReject  
NumberInsp.  
Stamp

130

QC8- Inspect parts - second check

0.00

*88 10/28/23*

QC

Memo

0.00

*6**1*

Quality Control

140

Chemical Conversion Coat per QSI005 4.1

0.00

HandFinish

Memo

0.00

*6 bl 20-8-24.*

Hand Finishing

150

QC3- Inspect Part Finish

0.00

QC

Memo

0.00

*M 10 08 24 (6)*

Quality Control

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: \_\_\_\_\_ PAR #: \_\_\_\_\_ Fault Category: \_\_\_\_\_ NCR: Yes No DQA: \_\_\_\_\_ Date: \_\_\_\_\_

Resolution: \_\_\_\_\_ Disposition: \_\_\_\_\_ QA: N/C Closed: \_\_\_\_\_ Date: \_\_\_\_\_

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
DATE	STEP	Description of NC Section A	Corrective Action Section B			Verification Section C	Approval Chief Eng	Approval QC Inspector
			Initial Chief Eng	Action Description Chief Eng	Sign & Date			

**NOTE:** Date & initial all entries

**Work Order ID 61228**

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Page 3

Item ID: D2938-1UP

Accept



Setup Start



Revision ID:

Stop



Item Name: 206 Saddle Left side-unpainted

Start Date: 8/11/10 Start Qty: 6.00



Cust Item ID:

Required Date: 8/25/10 Req'd Qty: 6.00



Customer:

Reference:

Run Start



Approvals: Process Plan: \_\_\_\_\_ Date: \_\_\_\_\_ Tooling: \_\_\_\_\_ Date: \_\_\_\_\_

Stop



QC: \_\_\_\_\_ Date: \_\_\_\_\_ SPC (Y/N): \_\_\_\_\_ Date: \_\_\_\_\_

Sequence ID/ Work Center ID	Operation Description	Set Up/ Run Hours	Tool ID	Tool #	Plan Code	Accept Qty	Reject Qty	Reject Number	Insp. Stamp
160	Identify as per dwg & Stock Location: <u>431</u>	0.00							
	Packaging	Memo							
Packaging		0.00							
170	QC21- Final Inspection - Work Order Release	0.00							
	QC	Memo							
Quality Control		0.00							

10/08/25 (6)

10/08/25 CL

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: \_\_\_\_\_ PAR #: \_\_\_\_\_ Fault Category: \_\_\_\_\_ NCR: Yes No DQA: \_\_\_\_\_ Date: \_\_\_\_\_

Resolution: \_\_\_\_\_ Disposition: \_\_\_\_\_ QA: N/C Closed: \_\_\_\_\_ Date: \_\_\_\_\_

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
DATE	STEP	Description of NC Section A	Corrective Action Section B			Verification Section C	Approval Chief Eng	Approval QC Inspector
			Initial Chief Eng	Action Description Chief Eng	Sign & Date			

**NOTE:** Date & initial all entries

# Picklist Print

August 11, 2010 11:06:49 AM

Page 1

Work Order ID: 61228



Parent Item: D2938-1UP



Parent Item Name: 206 Saddle Left side-unpainted

Start Date: 8/11/10

Required Date: 8/25/10

Start Qty: 6.00

Required Qty: 6.00

## Comments:

Component Item ID/ Item Name	Replacement Item ID	Mfg/ Purch	Bin Item	Primary Location	Last Location	Route Seq ID	Unit of Measure	Qty on Hand	Qty per Kit	Total Qty	Qty Issued	Date Issued	Status
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D6101-003

Manufactured

No

100

Each

22.0000

1

6



Saddle Billet, 7075

### Location

### Loc Qty

### Loc Code

MAT042

22

✓59196

22

67 DIP 10/08/10  
1 scrap.

**Dart Aerospace Ltd**

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: \_\_\_\_\_ PAR #: \_\_\_\_\_ Fault Category: \_\_\_\_\_ NCR: Yes No DQA: \_\_\_\_\_ Date: \_\_\_\_\_

Resolution: \_\_\_\_\_ Disposition: \_\_\_\_\_ QA: N/C Closed: \_\_\_\_\_ Date: \_\_\_\_\_

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
DATE	STEP	Description of NC Section A	Corrective Action Section B			Verification Section C	Approval Chief Eng	Approval QC Inspector
			Initial Chief Eng	Action Description Chief Eng	Sign & Date			

**NOTE:** Date & initial all entries



<b>DART AEROSPACE LTD</b>	<b>Work Order:</b>	61228
<b>Description:</b> 206 Saddle, Outboard, Left side	<b>Part Number:</b>	D2938-1
<b>Inspection Dwg:</b> D2938 Rev. C		Page 1 of 1

Inspect dimensions highlighted on inspection sheet drawing D2938 Rev. C and record below:

				Recorded Actual Dimensions					
Dim	Min	Max	Go/No Go Gauge	1	2	3	4	By	Date
A	0.100	0.140		0.130	0.131	0.129	0.129	118-120	Deep Mic
B	0.100	0.140		0.124	0.120	0.119	0.128		"
C	0.100	0.140		0.130	0.125	0.127	0.123		"
D	0.210	0.230		0.219	0.222	0.221	0.220	DJP-02	Mic
E	1.245	1.255			1.250	1.250	1.250	DJP-11	Vern
F	1.245	1.255			1.250	1.250	1.250		"
G	2.495	2.505			2.500	2.500	2.500		"
H	0.510	0.515			0.511	0.511	0.511		"
I	1.572	1.582		1.577	1.577	1.577	1.577		"
J	2.495	2.505		2.500	2.500	2.500	2.500		"
K	0.257	0.262		0.259	0.259	0.259	0.259		"
L	0.312	0.317		0	0.316	0.316	0.316		"
M	0.235	0.240			0.238	0.238	0.238	DJP-02	Mic
N	0.100	0.140		0.120	0.121	0.119	0.119		"
O	0.540	0.560		0.548	0.547	0.546	0.549	DJP-11	Vern
P	0.490	0.510			0.504	0.505	0.504		"
Q	3.715	3.725		3.720	3.720	3.720	3.720		"
R	2.720	2.760		2.740	2.740	2.740	2.740		"
S	0.240	0.270		0.246	0.246	0.247	0.249		"
T	0.100	0.180		0.140	0.140	0.140	0.140		"
U	1.625	1.635		1.630	1.630	1.630	1.630		"
V	1.362	1.372		1.367	1.367	1.367	1.367		"
W	0.316	0.321		0.318	0.318	0.318	0.318		"
X	1.250	1.270		1.263	1.264	1.2625	1.2605		Dial
Y	1.565	1.585		1.576	1.578	1.576	1.5745		"
Z	0.178	0.198		0.188	0.188	0.188	0.188		Rad gage
AA									
AB									
AC									
AD									
AE									
AF									
AG									
AH									
Accept/Reject				REJECT					

Measured by:	DJP
Date:	10/08/18

Audited by:	RF
Date:	10/08/23

Rev	Date	Change	Revised by	Approved
A		New Issue	RF	
B	02.12.12	Reformat; Added Dim. X-Y, DT8683, DT8686, DT8690	KJ/RF	
C	07.03.21	Revised per drawing revision C	KJ/JLM	

<b>DART AEROSPACE LTD</b>	<b>Work Order:</b>	61228
<b>Description:</b> 206 Saddle, Outboard, Left side	<b>Part Number:</b>	D2938-1
<b>Inspection Dwg:</b> D2938 Rev. C		Page 1 of 1

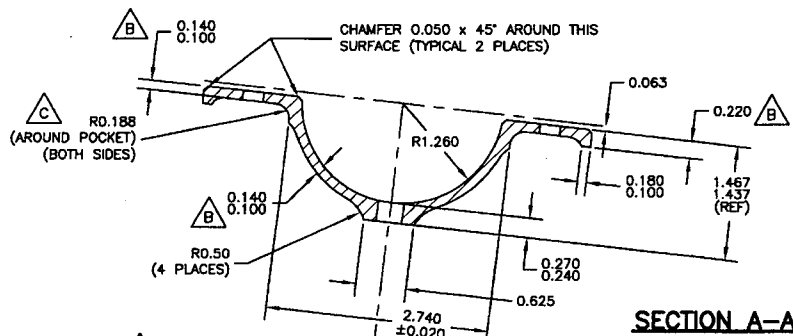
Inspect dimensions highlighted on inspection sheet drawing D2938 Rev. C and record below:

				Recorded Actual Dimensions					
Dim	Min	Max	Go/No Go Gauge	5	6	7	4	By	Date
A	0.100	0.140		0.130	0.128	0.129			
B	0.100	0.140		0.128	0.125	0.127			
C	0.100	0.140		0.125	0.126	0.126			
D	0.210	0.230		0.220	0.222	0.219			
E	1.245	1.255		1.250	1.250	1.250			
F	1.245	1.255		1.250	1.250	1.250			
G	2.495	2.505		2.500	2.500	2.500			
H	0.510	0.515		0.511	0.511	0.511			
I	1.572	1.582		1.577	1.577	1.577			
J	2.495	2.505		2.500	2.500	2.500			
K	0.257	0.262		0.259	0.259	0.259			
L	0.312	0.317		0.316	0.316	0.316			
M	0.235	0.240		0.238	0.238	0.238			
N	0.100	0.140		0.119	0.122	0.118			
O	0.540	0.560		0.548	0.549	0.548			
P	0.490	0.510		0.504	0.504	0.505			
Q	3.715	3.725		3.720	3.720	3.720			
R	2.720	2.760		2.740	2.740	2.740			
S	0.240	0.270		0.249	0.247	0.248			
T	0.100	0.180		0.140	0.140	0.140			
U	1.625	1.635		1.630	1.630	1.630			
V	1.362	1.372		1.367	1.367	1.367			
W	0.316	0.321		0.318	0.318	0.318			
X	1.250	1.270		1.2605	1.2625	1.259			
Y	1.565	1.585		1.576	1.577	1.573			
Z	0.178	0.198		0.188	0.188	0.188			
AA									
AB									
AC									
AD									
AE									
AF									
AG									
AH									
Accept/Reject									

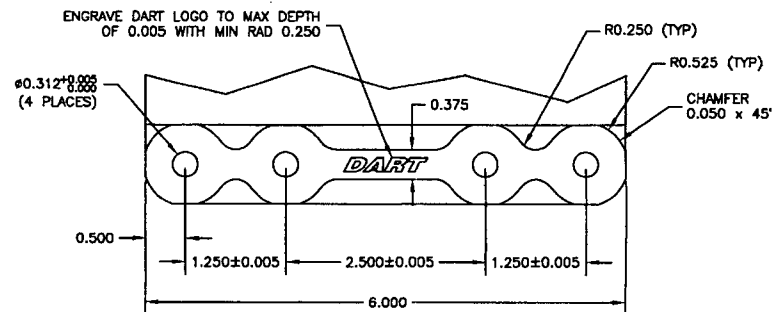
Measured by: DT  
Date: 10/08/18

Audited by: SB  
Date: 10/08/23

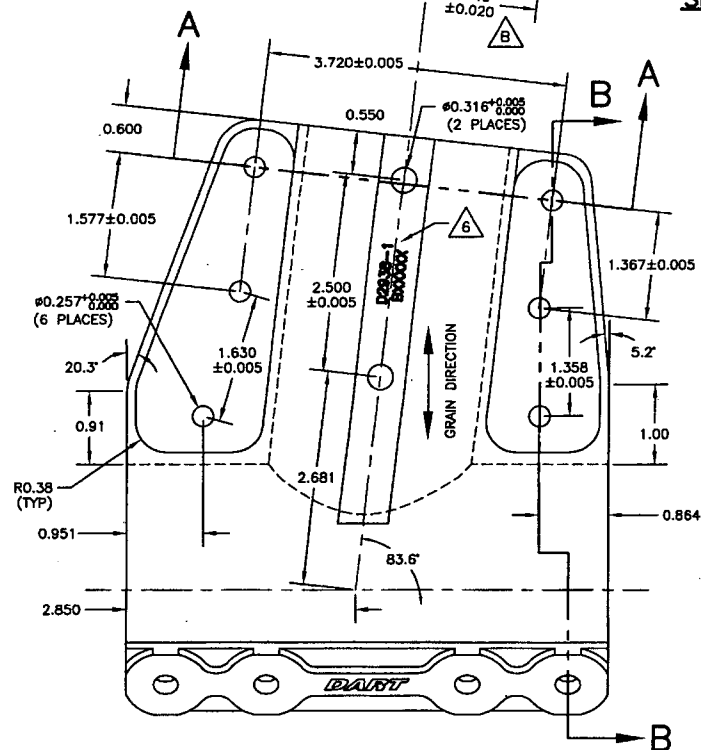
Rev	Date	Change	Revised by	Approved
A		New Issue	RF	
B	02.12.12	Reformat; Added Dim. X-Y, DT8683, DT8686, DT8690	KJ/RF	
C	07.03.21	Revised per drawing revision C	KJ/JLM	



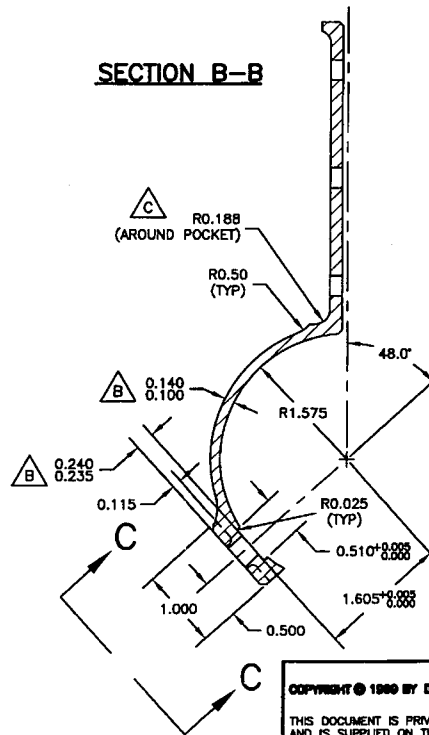
SECTION A-A



VIEW C-C



SECTION B-B



D2938-1 LH SADDLE (SHOWN)  
D2938-2 RH SADDLE (OPPOSITE)

- NOTES:
- 1) MATERIAL: ALUMINUM 7075-T7351 (QQ-A-250/12)  
(MAKE FROM D6101-003 SADDLE BILLET, 7075)
  - 2) FINISH: CHEMICAL CONVERSION COAT PER DART QSI 005 4.1  
POWDER COAT GLOSS WHITE (REF 4.3.5.1) PER DART QSI 005 4.3
  - 3) BREAK ALL SHARP EDGES 0.010 TO 0.020
  - 4) TOLERANCES ARE PER DART QSI 018 UNLESS OTHERWISE NOTED
  - 5) ALL DIMENSIONS ARE IN INCHES
  - 6) ENGRAVE PART AND BATCH NUMBER IN THIS AREA 0.010 TO 0.015 DEEP

C21018111  
W10:101228

C	06.11.09	R0.188 WAS R0.30 TO R0.25
B	00.05.29	CHANGED GEOMETRY AND MATERIAL
A	99.11.12	NEW ISSUE
DESIGN	DRAWN BY	<b>DART</b> DART AEROSPACE USA, INC. BELLEVUE, WA
CHECKED	APPROVED	DRAWING NO. D2938
DATE		TITLE SADDLE OUTSIDE
06.11.09		SCALE 2:3

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RELEASED

07.02.12

